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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/040,012	10/26/2001	Carlos M. Collazo	020897-000130US	8807

20350   7590   03/15/2007
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EXAMINER
BENGZON, GREG C

ART UNIT	PAPER NUMBER
2144	

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	03/15/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

-- *The MAILING DATE of this communication appears on the cover sheet with the correspondence address* --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.
- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *20 November 2006*.

2a)☐ This action is **FINAL**.   2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *4 and 5* is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *4,5* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All   b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.

4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

Supplemental Office Action

This Office Action is being issued to replace the Non-Final Rejection mailed on 01/24/2007 . Claims 4-5 are pending.

Continued Examination Under 37 CFR 1.114

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 11/20/2006 has been entered.

Priority

This application claims benefits of priority from US Provisional application 60243783, filed October 26, 2000.

The effective date of the subject matter in the claims in this application is October 26, 2000.

Information Disclosure Statement

The information disclosure statements (IDS) submitted on 11/20/2006 are in compliance with the provisions of 37 CFR 1.97. Accordingly, the information disclosure statements are being considered by the examiner.

Claim Rejections - 35 USC § 101

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claims 4-5 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 4-5 are directed towards a method for calculating integer values, said integer reflecting the capacity of the server to receive work loads. The claims are non-statutory as they do not produce any useful and tangible result. The Examiner notes that the integer values by themselves do not accomplish any tangible result, nor are said integer values used to accomplish any tangible result, nor are said integer values embodied in any tangible result.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set
> forth in section 102 of this title, if the differences between the subject matter sought to be patented and
> the prior art are such that the subject matter as a whole would have been obvious at the time the
> invention was made to a person having ordinary skill in the art to which said subject matter pertains.
> Patentability shall not be negatived by the manner in which the invention was made. .

Claims 4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hafez

et al. (US Patent 6513065), hereinafter referred to as Hafez , in view of Strandberg et

al. (US Patent 6647412), hereinafter referred to as Strandberg.

Hafez substantially disclosed the invention as follows.

Hafez disclosed (re. Claim 4) a method for assessing server and network of

servers capacity, (Hafez – Column 9 Lines 65) summarized through two integer values

representing Local Node Value (LNV) and Composite Node Value (CNV), (Hafez –

Column 12 Lines 5-15, Column 15 Lines 45-50) respectively, the method comprising:

calculating the LNV of a server as an integer value through a combination of measured

counters at the same point in time (Hafez - Column 12 Lines 45-50), the LNV reflecting

the capacity of the server to receive work loads;

Hafez does not disclose a method for collecting information about a network's

operation comprising using peer-to-peer communication among a plurality of devices in

the network to obtain a measure of the network performance. While Hafez disclosed a

method for calculating a combination and summarization of node values (Hafez - Figure

8a-8b,Column 12 Lines 60-65), Hafez did not disclose (re. Claim 4) calculating the CNV

of a beginning server as an integer value through a combination of the LNVs of a

subnetwork of servers that begins with the beginning server, the calculation of the CNV

including the LNV of the beginning server, the CNV reflecting the capacity of the sub-

network beginning with the beginning server to collectively receive workloads.

Strandberg disclosed (re. Claim 4) a method for propagating node information

through ingress, core, and egress nodes using peer-to-peer communication in a

differential network, (Strandberg- Figure 3, Column 1 Lines 55-65, Column 2 Lines 1-

10) said node information containing performance parameters such as packet loss,

delay rate, queue load, service rate and stability. (Strandberg - Figure 3, Column 3

Lines 1-5). Strandberg disclosed (re. Claim 4) calculating the CNV of a beginning

server as an integer value through a combination of the LNVs (Strandberg - Figure 3,

Column 3 Lines 1-5) of a subnetwork of servers that begins with the beginning server,

the calculation of the CNV including the LNV of the beginning server, the CNV

reflecting the capacity of the sub-network beginning with the beginning server to

collectively receive workloads. (Strandberg – Column 6 Lines 60-65)

Hafez and Strandberg are analogous art because they present concepts and

practices regarding the capture and assessment of network performance

measurements. (See Strandberg Column 4 Lines 1-5, Column 6 Lines 10-65) At the time of the invention it would have been obvious to a person of ordinary skill in the art to combine the teachings regarding peer-to-peer communications by Strandberg into the method of Hafez , such that the data collection components (i.e. agents) are able to exchange information with each other (i.e. other agents) and not just the central monitoring system (i.e. console). The suggested motivation for said combination would have been , as Hafez suggests (Hafez - Abstract), so that performance data may be summarized on several levels, where each summarization level is coarser in granularity than the previous level. It would have been obvious to a person of ordinary skill in the networking art that the data captured by Strandberg on a per-hop basis, not just on an endpoint-to-endpoint basis, would provide an increased level of granularity that Hafez strives to obtain. Furthermore, since Hafez is presenting a network monitoring system that strives to predict network performance for hypothetical scenarios, it would have been obvious to combine Strandberg in order to allow the status information to be available at the ingress node before the traffic enters the network, thereby enhancing the response capabilities to dynamic network conditions (Strandberg - Column 1 Lines 50-55, Column 9 Lines 1-10)

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hafez et al. (US Patent 6513065), hereinafter referred to as Hafez , in view of Strandberg et al. (US Patent 6647412), hereinafter referred to as Strandberg further in view of Waclawski (US Patent 6377907).

Hafez-Sandberg substantially disclosed the invention as follows.

Hafez-Sandberg disclosed (re. Claim 5) obtaining a plurality of characteristics or counters at a specific point in time (Hafez – Column 12 Lines 45-50) and combining counters. (Hafez-Column 10 Lines 15-20)

However Hafez-Sandberg did not disclose (re. Claim 5) counters that are combined through correlation matrixes and weighted sums, the correlation matrixes and weighted sums being updated over a period of time to reflect historical changes over the period of time.

Waclawski disclosed (re. Claim 5) counters that are combined through correlation matrixes (Waclawski-Column 8 Lines 60-65) and weighted sums (Column 11 Lines 20-25), the correlation matrixes and weighted sums being updated over a period of time to reflect historical changes over the period of time.

Hafez,Strandberg, and Waclawski are analogous art because they present concepts and practices regarding the capture and assessment of network performance

measurements. At the time of the invention it would have been obvious to a person of ordinary skill in the networking art to combine the teachings of Waclawski into Hafez-Strandberg. The motivation for said combination would have been, as Waclawski disclosed (Waclawski-Column 1 Lines 40), to provide a means for selecting the most significant performance metrics.

Response to Arguments

Applicant's arguments filed 11/20/2006 have been fully considered but they are not persuasive.

The Applicant presents the following argument(s) [*in italics*]:

Hafez discloses a method for summarization of node values across a time axis, processing individually every data type but not producing a single value based on the combinations of different metrics at a specific point in time. In addition, the summarization methods taught by Hafez do not produce a single value for counters or gauge.

The Examiner respectfully disagree with the Applicant. Hafez disclosed (Column 10 Lines 15-20) a workload as a grouping of performance metrics, and also disclosed calculating metrics based on other metrics (Column 11 Lines 25-30) and displaying a single numerical value resulting from said calculation. Thus Hafez disclosed a metric value based on a combination of different metrics.

Furthermore, where the metrics are captured for real-time monitoring (Column 9 Lines 35), and Hafez disclosed displaying the workload (Column 10 Lines 45) then Hafez disclosed combining metrics at a specific point in time [current interval period].

The Examiner notes that Hafez disclosed computing performance statistics including utilization, which refers to the total amount of resources consumed by all the processes in the host computer.

The Applicant presents the following argument(s) [*in italics*]:

Hafez does not teach or suggest the use of correlation matrixes and weighted sums to produce the integer values for the same point in time.

The Examiner present prior art by Waclawski which disclosed the use of correlation matrixes reflect performance metrics.

Conclusion

Examiner's Note: Examiner has cited particular columns and line numbers in the references applied to the claims above for the convenience of the applicant. Although the specified citations are representative of the teachings of the art and are applied to specific limitations within the individual claim, other passages and figures may apply as well. It is respectfully requested from the applicant in preparing responses, to fully consider the references in entirety as potentially teaching all or part

of the claimed invention, as well as the context of the passage as taught by the prior art

or disclosed by the Examiner.

In the case of amending the claimed invention, Applicant is respectfully

requested to indicate the portion(s) of the specification which dictate(s) the structure

relied on for proper interpretation and also to verify and ascertain the metes and bounds

of the claimed invention.

The prior art made of record and not relied upon is considered pertinent to

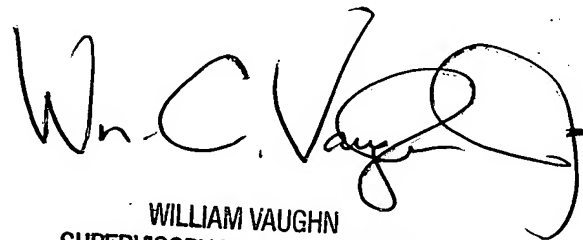applicant's disclosure. Please refer to the enclosed PTO-892 form.

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Greg Bengzon whose telephone number is (571) 272-

3944. The examiner can normally be reached on Mon. thru Fri. 8 AM - 4:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, William Vaughn can be reached on (571)272-3922. The fax phone number

for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 **(IN USA OR CANADA)** or 571-272-1000.

gcb

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